Midwest Cold Atom Workshop, Nov. 14-15, Argonne National Laboratory

Friday, Nov. 14, Building 460 (Guest House)

6:00 – 7:00 Buffet pizza dinner 6:00 – 9:00 Poster session

Saturday, Nov. 15, Building 203 Auditorium (Physics Division)

08:00 Registration desk opens

Session I Chair: Cheng Chin

| 08:30 - 09:00 | Jesus Perez-Rios, Purdue, Low energy ion-atom-atom recombination theory |
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| 09:00 - 09:30 | Wenchao Xu, UIUC, Recent results from the DeMarco group |
| 09:30 - 10:00 | Li-Chung Ha, Chicago, Roton-Maxon excitations of Bose condensates in a |
| | shaken optical lattice |

Session II Chair: Georg Raithel

| 10:30 - 11:00 | Richard Parker, Argonne, The first measurement of the radium EDM |
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| 11:00 - 11:30 | Arnaud Leredde / Adrian Perez-Galvan, Argonne, Studies of the beta-neutrino |
| | correlations with trapped atoms: He-6 and B-8 |
| 11:30 - 12:00 | Stephanie Miller / Kaitlin Moore, Michigan, Recent results from the Raithel |
| | group |

12:00 - 01:30 Lunch

12:30 - 01:30 Lab tour

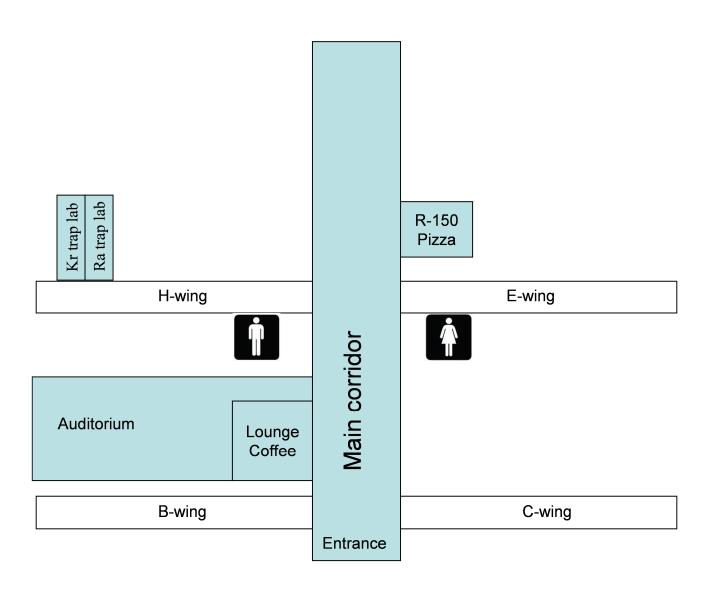
- Guided tours of the ATLAS accelerator depart at 12:30 and 1:00;
- Trap labs in the H-wing are open throughout the hour.

Session III Chair: Thad Walker

| 1:30 - 2:00 | Brian Odom, Northwestern, Getting trapped molecules in the quantum toolkit |
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| 2:00 - 2:30 | Minho Kwon, Wisconsin, Rydberg atoms and ensemble blockade |
| 2:30 - 3:00 | <u>Tian Xia</u> , Wisconsin, Quantum gates and entanglement in an array of Cs qubits |

Session IV Chair: Chris Greene

| 3:30 - 3:50 | Nick Brewer, Wisconsin, Left-handed electromagnetic waves in rare-earth |
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| | doped crystals |
| 3:50 - 4:10 | Ariel Sommer, Chicago, Rydberg polaritons in an optical cavity |
| 4:10 - 4:30 | Hudson Smith, OSU, Creating and destroying universal molecules with an |
| | oscillating magnetic field |
| 4:30 - 4:50 | <u>Tigran Sedrakyan</u> , Minnesota, Chiral spin liquid with spinless cold atoms |



Building 203, Physics Division